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JUNE 1989

ELECTRIC LIGHT & POWER

EL&P

Volume 67, Number 6
A PENNWELL PUBLICATION

VOICE OF THE ELECTRIC UTILITY INDUSTRY

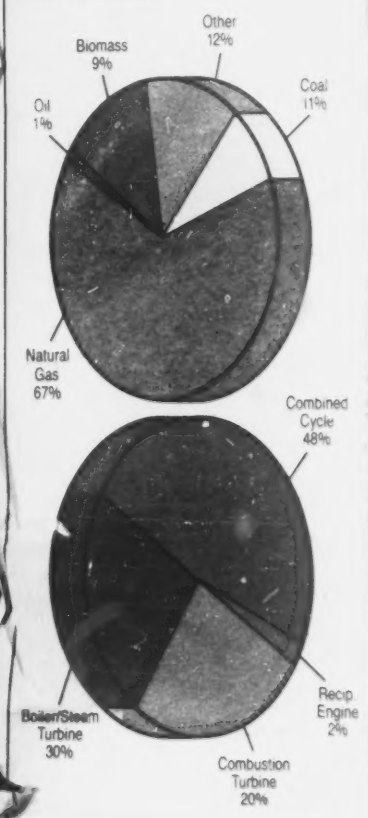
Top 100

24th annual report starts on page 13

COGENERATION CAPACITY ADDITIONS 1980-1987

(11,827 MW total)

Cogenerators added a total of 11,827 MW to the electricity available in this country in the time period of 1980-87, said Bruce A. Hedman, asst. director, power generation, Gas Research Institute, at the Energy Technology Conference held in Washington, DC, Feb. 28-Mar. 2. The breakdown he gave of the sources of that energy are shown in the two pie charts below.



'88 was a better year for Top 100

BARRINGTON, IL—The nation's Top 100 Electric Utilities—the largest investor-owned electric companies in the country—rebounded in 1988 after a difficult year in 1987. Kilowatthour sales and revenues increased substantially. Earnings per share, which fell in 1987, were up in 1988, even though total net income for the companies fell.

These are the major conclusions reported in *Electric Light & Power's* 24th Annual Top 100 Electric Utilities Report, which begins on page 13.

Kilowatthour sales gained 5.3 percent during 1988, to 2.18 trillion kWh. Leading the gain were commercial/small light and power customer sales, which increased 6.1 percent.

Revenues, which also include returns from diversified activities of holding companies and companies that act similarly, climbed 4.8 percent. Revenues from electric operations only were up 4.5 percent on the strength of the kWh sales increase.

Net income from all operations hit $14.4 billion in 1988, a decline of 7.4 percent from 1987. Net incomes suffered from disallowances of construction investments in abandoned facilities and from reduced Allowances for Funds Used During Construction, which held down the size of positive gains. At the same time, several utilities suffered large losses, which pulled total net income change down in the negative range.

Despite this, earnings per share increased to $2.44 from $2.10 in 1987.

Net plant increased by 1.5 percent, to $354.8 billion, while long-term debt grew 1.4 percent to $158.7 billion.

The number of electric customers grew 1.8 percent, to 80.7 million.

LATE NEWS

The NRC granted Seabrook low-power testing after a court rejected a stay on May 25.

WPL Holdings raised its stock offer to 1.75 shares. See below.

Bechtel and B&W expect a final contract for Rancho Seco operation early in July.

A higher annual energy growth rate over peak demand in 1998 should result in higher system annual load factors and increased use of existing and future generation and transmission, said NERC. Indicating summer '98 requirements, peak demand was projected to be 691,727 MW, +2 percent growth/year from 577,149 MW for '88; planned capacity '98, 840,174 MW, +1.3 percent/year from 745,378 MW; annual net electricity use '98, almost 3.9 trillion kWh, +2.1 percent/year from 3.2 trillion kWh.

MGE rejects WPL Holding's merger offer

MADISON, WI—Madison Gas and Electric Co. rejected the offer of 1.67 WPL Holdings Inc. common stock shares per MGE share.

MGE's board of directors concluded that the WPL-proposed combination would not be in the long-term interests of the shareholders, customers, or employees of MGE, nor of the communities it serves. WPL suggested discussions about a possible combination March 3, and made the offer March 8.

The board said, in a May 9 letter to shareholders, the key to MGE's future as an independent company is its "exceptional service territory. No other service territory in Wisconsin combines

Continued on page 7

Seabrook low-power testing expected

WASHINGTON—Opponents to Seabrook nuclear plant filed a request in U.S. Circuit Court of Appeals for an emergency stay against low-power testing May 11, just days before the Nuclear Regulatory Commission was expected to grant a low-power license.

In what seemed the last hurdle to regulatory approval, NRC staff expressed satisfaction with provisions of a $72.1 million surity bond. The insurance was put forth by the 12 owners to show that money was available to decommission the plant if it does not operate after low-power testing.

Opponents to plant operation—Massachusetts Attorney General James Shannon; Hampton, NH; and the Seacoast Anti-Pollution League and the New England Coalition on Nuclear Pollution—filed the request. If the stay is refused, and if the NRC approves, plant operators could complete low power testing before a full appeal could be heard.

Pending NRC approval, low-power testing will start by late May for the 1150-MW reactor.

Deputy Secretary W. Henson Moore said in recent Senate testimony that "Without Seabrook, New England utilities will burn an extra 11 million barrels of oil per year for at least five years."

In related news, the state of New Hampshire passed legislation that allows takeover of Public Service New Hampshire. PSNH, with a 35.6-percent ownership in Seabrook, is under bankruptcy reorganization. The state fears rate increases that might accompany a switch to federal regulation, proposed under one reorganization plan. PSNH said it considers the state another prospective bidder.

PSNH was working on a conscensual reorganization plan, which was due mid-May. If progress is being made, the bankruptcy court judge may grant an extension instead of accepting reorganization plans from other parties.

New England Electric System Co. and Northeast Utilities Co. both submitted bids for PSNH operating assets. New Hampshire Electric Cooperative Inc. offered to buy PSNH's Northern Division.

Plant operator New Hampshire Yankee may start low-power testing by the end of May, if the NRC approves and if a court refuses to grant a stay. Majority owner Public Service New Hampshire, now in bankruptcy court reorganization, faces a new challenge from a recently approved law that allows a state buyout.

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News Briefs

JILL MINNER, Assistant Editor

Fourth Grand Gulf increase is phased-in

Arkansas Power and Light Co. received the fourth increase of a five-year phase-in plan for its share of costs associated with the Grand Gulf nuclear power plant, according to the National Association of Regulatory Utility Commissioners Bulletin. The Missouri Public Service Commission approved the $6-million phase-in plan three years ago. The first three rate increases were 6.6 percent, 3.25 percent and 3.25 percent respectively. The fourth increase, which went into effect March 21, was 3.25 percent or $1.4 million, NARUC reported.

NRC approves TMI-2 water evaporation

The Nuclear Regulatory Commission has approved the evaporation of 2.3 million gallons of water processed by TMI-2, according to GPU Corp. The Atomic Safety and Licensing Board gave its approval of the process in February. GPU said it expects to have the evaporator ready to operate by August.

NYPA and ConEd sign power agreement

The New York Power Authority and Consolidated Edison Co. of New York signed a power agreement that is expected to save taxpayers $1.4 billion over the next 10 years. Under the agreement, NYPA will provide all of the electricity for government agencies in New York City and most of Westchester County, while Con Edison will deliver the power. The agreement also allows NYPA to use electricity from its upstate plants and from Hydro-Quebec to meet the government agencies' power demands.

NYPA Chairman Richard M. Flynn (seated left) and Con Edison Chairman Arthur Hauspurg (seated right) sign a cost-saving power agreement. Looking on are New York Mayor Edward I. Koch (right) and Stanley E. Grayson, deputy mayor for finance and economic development.

UtiliCorp, Hadson team up for power project

UtiliCorp United said it plans to join Hadson Corp. in a project that will supply power to retail electric distribution cooperatives in Virginia that are currently buying capacity from Old Dominion Electric Cooperative in Richmond, VA. The companies said their subsidiaries, UtiliCo Group and Ultrasystems Development Corp., will develop and construct three, 150-MW, coal-fired independent power facilities. Completion of the first three facilities is expected in 1993, according to UtiliCorp.

OPPD to spend $2M to improve service area

The Omaha Public Power District (OPPD) plans to spend over $2 million in contracts for the maintenance and improvement of systems in its service area. "It takes a great deal of work to keep existing lines in good condition and make necessary improvements to the system. Supplementing our personnel with a private contractor helps us to do that economically by providing additional crews during the peak construction season," explained OPPD President Fred M. Petersen. Work on overhead and underground electric power lines will begin this month and continue for a three-year period, according to OPPD.

DE awarded for waste reduction program

Detroit Edison received an Environmental Excellence Award from the Michigan Department of Natural Resources for its solid waste reduction program. The utility was awarded for the development and implementation of a method to treat chemical wastes at its Monroe Power Plant. The method reduced the amount of chemical waste sludge produced at Monroe by 75 percent, according to the company. Detroit Edison said that its program will also save the company $350,000 a year.

NARUC utility planning conference to be held

The National Association of Regulatory Utility Commissioners (NARUC) will hold its second annual Least-Cost Utility Planning Conference in Charleston, SC on September 11-13. NARUC said the conference is designed to promote a discussion on the concept of least-cost utility planning and to provide assistance to state utility commissions in the development and improvement of existing least-cost plans. For more information contact Mike Foley at (202) 898-2214.

Hearing set for VEPCo construction requests

Virginia Power's request for construction of a combined cycle generating unit and several combustion turbines will be heard on July 5 by the State Corporation Commission. The utility has filed applications to build a 215-MW, advanced combined-cycle facility at a cost of $134 million, and 325-MW of combustion turbines estimated at $111 million.

NRC extends property insurance deadline

The Nuclear Regulatory Commission has extended its deadline for power reactor licensees to purchase on-site property insurance policies containing certain accident coverage provisions. The provisions require that proceeds from the insurance policies be paid to an independent trustee, after first being used to stabilize and decontaminate a reactor following an accident. The new deadline of April 4, 1990 gives insurers more time to incorporate the required provisions into their policies and to find parties willing to act as trustees. According to the commission, insurers and representatives of the nuclear utility industry have submitted three petitions for rulemaking that propose rescinding the trusteeship provisions.

Boston Edison checks Pilgrim feedwater leak

Boston Edison reported that it is still trying to determine the cause of a 50-gallon feedwater leak at its Pilgrim Nuclear Power Station. "Our preliminary assessment is that the leak was probably caused by a combination of a check valve malfunction and personnel error," stated Ralph Bird, Boston Edison senior vice president-nuclear. In addition to the utility's investigation, a team of five inspectors from the Nuclear Regulatory Commission were sent to assess the problem. Pilgrim is currently operating at about 25-percent reactor power, according to Boston Edison.

PUC pays intervenors for role in PG&E case

The California Public Utilities Commission said it compensated the San Luis Obispo Mothers for Peace and Rochelle Becker for their help with Pacific Gas and Electric Co.'s Diablo Canyon settlement. The intervenors received $35,000 for their evidence and cross-examining of witnesses on the effects of performance-based pricing on plant safety and on whether a proposed safety committee would be effective, according to the PUC. Under California law, intervenors who make a substantial contribution to a PUC decision and demonstrate financial need may receive compensation.

EPRI chairman named

The Electric Power Research Institute has appointed Robert N. Cleveland chairman of the board. Cleveland, president emeritus of Ohio Rural Electric Cooperatives Inc. and Buckeye Power Inc., served as vice chairman for EPRI during 1988. Public Service Enterprise Group Inc. Chairman, President and CEO E. James Ferland was named vice chairman at EPRI.

IP picks president

Larry D. Haab was named president of Illinois Power Co. succeeding Wendell J. Kelley, who will continue as chairman and CEO of the company. Haab, who joined Illinois Power in 1965, has served as executive vice president, chief financial officer and as a member of the board. Kelley described Haab as "an extremely capable executive with an excellent background in finance...."

Colorado-Ute suspends payments to lenders

Colorado-Ute Electric Association's Board of Directors announced that, due to liquidity problems, the company would have to suspend aggregate payments of $12.6 million to the Rural Electrification Administration and the National Rural Utilities Cooperative Finance Corp. The board also initiated a program to work out the company's financial problems with its creditors. "The board's decision to suspend payments to Colorado-Ute's lenders was made to assure the continued liquidity of the company and to assure uninterrupted services to the company's 14 member-owners," stated Colorado-Ute President and CEO Robert D. Vold. As of March 1, 1989 Colorado-Ute had approximately $892 million in outstanding obligations, according to the company.

Utilities fined by NRC

The Nuclear Regulatory Commission recently proposed the following fines:

Arkansas Power & Light
A $175,000 fine for apparent violations of NRC requirements in the operation of the Arkansas Nuclear One power station.

Duke Power
A $25,000 civil penalty for alleged violations of NRC requirements at the Oconee nuclear power plant.

Portland General Electric
A $75,000 fine for alleged violations of NRC requirements involving control of the quality of materials installed in the Trojan nuclear plant.

In This Issue

Industry News

American Power Conference session on wheeling turns into debate. 6
24th Annual Top 100 Electric Utilities Financial Report focuses on performance of the nation's largest electric utility companies in 1988. 13
Demand-side management strategies integrate utility thinking. 21
New SO_2-control systems installed at Public Service Colorado. 24
Shipping costs for nuclear materials may skyrocket under proposed legislation. 34

Generation Technology

Use of a computerized equipment and parts database could save the industry millions of dollars every year. 29
Computerized tagouts simplify and make safe tagouts at generating plants. 30

T&D Technology

Spending for distribution automation will keep going up. 37
Fiber-optic SCADA system at PG&E saved new digging costs. 39
IEEE/PES T&D conference and exhibition drew record crowds. 40

Regular Features

Commentary 4
Letters 4
Financial Performances 20
Labor/Managment Concerns 26
Information/Control Systems 36
Rate Activity 44
New Products 46
Readers' Service 51
Calendar 53
Bulletin Board 54
Regulatory Review 63
Management Methods 64

COMMENTARY

Solid foundations today will allow expansion tomorrow...

For the majority of large electric utility companies that make up *EL&P's* Top 100, 1988 was a good year. Now the success of 1988, continuing through the first five months of 1989, suggests that the time is fast approaching when the Top 100, and others, again must begin building new generating capacity...and that's where they began to get into the financial troubles from which they've just emerged.

Kilowatthour sales moved ahead more than 5 percent in 1988 and revenues were up by almost 5 percent. Diversified, non-utility businesses began to make differences on profit and loss statements, their revenues growing even faster than utility-only business. Common stock earnings, which fell in 1987, edged up in 1988, although the cumulative net income of the group fell as the result of large losses posted by four companies: Long Island Lighting (-$1.1 billion), Detroit Edison (-$429 million), Centerior Energy (-$74 million) and New England Electric System (-$54 million).

Even more important than the size of the earnings gain is that the quality of the earnings improved substantially. For 1988, earnings represent more real dollars and less paper gains resulting from high allowances for use of funds during construction. With better earnings, and with construction programs winding down, more work was covered by internally generated funds and less from borrowed funds. Utilities now are financially stronger.

While most of the Top 100 electric utilities are enjoying the fruits of their labors and the effects of lower demands for funds and stringent cost controls, continuing increases in usage and demand are again placing growing pressures on power supply reserves. Several areas of the country could suffer substantial inconveniences—brownouts or blackouts—should the summer prove to be a repeat of last year, with prolonged record heat and little rainfall. The short-term tactics of buying Canadian power and acquiring energy from adjacent pools could fall short of providing even a band-aid to the festering infection of non-constructivitis that has become the prophylactic of choice for utility managers.

The electric utility industry has preached the gospel of gloom, doom, and impending electricity shortages since early effects of the energy crisis showed the possibility of over-construction in the latter days of the '70s. In recent years, the industry has been accused of crying "wolf, wolf" all too often.

So it isn't surprising that new construction of generating facilities is about the last thing that utility managers would want to touch. The marked propensity of state commissions to exercise 20-20 hindsight in evaluating utility decision-making and disallowing plant investments has made even contemplation of new generating facility construction distasteful.

But the time is fast approaching when responsible electric utility managements will be unable to duck their responsibilities any longer. The most palatable aspect will be that most managements of large investor-owned electric utilities are in far better financial positions to embark on generation expansion programs than at any time in a decade.

...but who will dictate what systems will be like?

Whenever we express concern about electric utility equipment manufacturers getting out of the business by selling some or all of their operations to offshore owners, we get nasty phone calls and letters from manufacturing managements. Those protests, in some cases, have been preceded by only a few months announcements of the sale of those operations to offshore owners.

We bear offshore suppliers no ill wishes. Rather, we are only concerned that the lack of domestic entrepreneurial courage, creative engineering and management competence means that the electric utility systems we will live with in the future will be shaped by directions from outside the U.S. This is not a question of national pride: rather its a matter of national security.

Robert A. Lincicome, Editor-in-Chief

EL&P ELECTRIC LIGHT & POWER

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ELECTRIC LIGHT & POWER (USPS 858-860) is published monthly by the PennWell Publishing Company, 1421 S. Sheridan Road, Tulsa, OK 74112.

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Officers of PennWell Publishing Company are Philip C. Lauinger, Jr. Chairman/Chief Executive; Joseph A. Wolking, President; Joseph T. Bessette, Group Vice President, John Maney, Vice President/Finance. Electric Light & Power editorial offices are located at 1250 S. Grove Avenue, Barrington, IL 60010. Phone (312) 382-2450. Distributed to executives and engineers in U.S. electric utilities and consulting engineering firms. Second class postage paid at Tulsa, OK. Subscription: $38 per year (U.S.), $66 (foreign), $108 (foreign air mail). Single issue price: $4 + postage ($7 + postage foreign). Copies of back issues are available on microfilm from Univ. Microfilm, 300 N. Zeeb Road, Ann Arbor, MI 48103, and on microfiche from Micro-Photo Div. of Bell & Howell, Old Mansfield Road, Wooster, OH 44691. POSTMASTER: Send address changes to ELECTRIC LIGHT & POWER, P.O. Box 2680, Tulsa, OK 74101.

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LETTERS

Cogen and utilities

I was extremely surprised to read some of the statistics that were attributed to Gerald C. Werner, Director of Customer Field Services for the United Illuminating Company in your April 1989 issue, page 16. While the title of the article "Customer Service is the Best Defense to Cogen" did not lead me to anticipate much praise of the cogeneration industry, the quote that (in UI's territory) "49 of 50 (cogeneration) units are abandoned—most customers give up on maintaining them" caused me to spill my coffee all over my desk. As my company, International Cogeneration Corporation, is operating two plants in the described area, and I am aware of many others, I knew this to be incorrect.

I called Mr. Werner to try to understand what he might have meant and he told me that the context of the quote was mistaken. The "49 of 50" statistic was referring to something completely different. In fact, of packaged systems installed in the 1980's in UI's territory, Mr. Werner told me that twenty-three of twenty-four are still in operation. The twenty-fourth, I have learned, has been turned off because the thermal load that it had been designed to serve is no longer in use. Instead of installing a stable of dead machinery and dropping out of the picture, as your article suggested, the small cogeneration industry in Southern Connecticut has stuck with our customers and our equipment.

An additional disagreement that I had with the article was its implication that packaged cogeneration systems are unreliable. In the three-and-a-half years that we have been operating units in Pennsylvania, New York, New Jersey, and Connecticut, we have found the quoted EPRI availability statistic of 80 percent to be significantly low. The fact that, as Mr. Werner said, "among UI cogenerators only nine percent were available on UI's peak day in 1988" says more about the weighting of statistics and the design of the units than it does about their reliability. According to Mr. Werner, one 5300 kW gas turbine unit makes up 78 percent of the small cogeneration nameplate capacity in UI's territory. That unit was out of service on UI's peak day last summer, skewing the given statistic considerably. Of the small packaged units, nine of eleven were online all day or cycling on thermal load, as designed. Of the other two, one had been switched off because the thermal load had been disconnected. The eleventh unit was down for repair. Thus, in contrast to your implied conclusion, I see this data as showing that small cogeneration systems can run predictably and reliably.

The independent cogeneration industry is a competitor to the electric utility industry, and we will always find reasons to disagree. But, as I found in discussing this article with Mr. Werner, there are common avenues for developing energy supply options that can benefit both the customer and the country. This is what our dialogue should be about. I am afraid that that common ground may never be reached if you slant your reporting so considerably.

P. Richard Heimann
Director, Energy Services
International Cogeneration Corp.
Philadelphia, PA

***Ed. Note:** If there was a negative "slant" to the report, it was an unintentional error that resulted from condensing Mr. Werner's remarks. We appreciate Mr. Heimann's clarification and appreciate the opportunity to use him as a source of cogeneration information in the future.*

Engineers and Engineers' Week

I would like to comment on the letter (EL&P April 89, pg. 33) by Mr. Peter Kushkowski concerning the apparent lack of recognition of *National Engineers' Week* and especially on his reference to Thomas Edison as the "patron saint" of utility engineers. Yes, utility engineers do need to be ingenious in many aspects of their work in order to continue to produce the safe, reliable and economic power which the public gladly consumes, but does not seem to appreciate.

Utility engineers do seem to fight an up-hill battle against public criticisms and scrutiny and against increased regulations. However, we do not need the likes of Thomas Edison now. Instead, we need the true "father" of today's electrical power industry, a genius whose sole purpose in life was to make scientific discoveries and apply them in a practical manner. Unlike Edison, his contemporary, this genius had acquired a true engineering degree. Whereas Edison worked incessantly to "make a buck," this genius worked incessantly to apply electrical science and technology and to make invaluable contributions to humanity. Edison made money and lots of it by making any conceivable device that people would buy. Our true genius, on the other hand, only made devices that involved the newly discovered electro-magnetic energy and that people would need.

These two men did meet in those early days of the late 1800's when the utility industry was born, but it was not Edison who applied the alternating current technology we use today. Nor did Mr. Edison appreciate what our true genius had to offer, but instead displayed contempt. No, Mr. Edison did not believe there was much value in a formal engineering education, and he made it quite clear in his well-known comment, "success is 99 percent perspiration and 1 percent inspiration."

At a time when people in Brooklyn were dodging electrically-driven trolleys (origin of the baseball team name "Brooklyn Dodgers") and people there and elsewhere across the country were learning about the many uses of electricity, tobacco-chewing Mr. Edison stayed with his DC technology, on which many of his patents relied. In fact, Mr. Edison tried to turn public sentiment against Mr. Westinghouse's newly adopted alternating current technology in order to gain favor for his inferior direct-current technology by using such outrageous methods as electrocuting small animals to demonstrate the dangers of AC power! Some "saint."

No, Mr. Edison did not succeed in his attempts, thankfully, and, no, our genius is not Mr. Westinghouse either. The true genius and father of the utility industry receives far less recognition than do today's engineers. The true genius was Nikola Tesla.

Clearly, with so many utilities having adopted the namesake of Thomas Edison and not a single one using the name Tesla (not even Colorado-Ute whose nearby copper mines produced much of this country's initial supply for copper wire at the turn of this century and which owed its successful nighttime mining operations to Tesla's application of AC power for their lights in place of their ineffective DC system), is it any surprise that the utility industry generally regards "National Engineers' Week" as insignificant?

Francis J. Lorin, B.S.Ch.E.
CyberChem Company
Columbia, MD

Continued on page 7

24th Annual Top 100 Electric Utilities Report

Sales revenues, EPS climbed in '88

Robert A. Lincicome
Editor-in-Chief

The nation's 100 largest investor-owned electric utilities enjoyed solid gains in kilowatthour sales and revenues in 1988. Net incomes fell, but average per-share earnings increased 14 percent, to $2.44.

Even more important, the quality of per-share earnings was improved because, for most companies, accounting procedures such as Allowances for Funds Used During Construction played a lesser role than in previous years.

In other words, 1988 was a better year for most of the nation's large investor-owned electric utilities than 1987. Although a number of companies posted net incomes that were somewhat smaller than a year ago, the major part of the 10.3-percent drop in total net income was largely attributable to financial problems encountered by just two electric utilities—Detroit Edison Co. and Long Island Lighting Co., which between them lost $1.55 billion of the total income decline of $1.66 billion.

KWh sales and revenues grew

As in last year's report, kilowatthour sales, which increased 5.29 percent, were a bright area of utility performances. This is especially encouraging since it came on top of a 3.5-percent increase. Last summer's series of heat storms, which sent temperatures soaring to 100-year record levels repeatedly in many parts of the country, was the major factor.

With sales performance up, electric revenues also increased. The gain in 1988, 4.8 percent, closely paralleled kWh sales performance and reflected a solid rebound from last year.

Regulatory actions disallowing investment in abandoned, high-cost facilities, which led to accounting writeoffs, were a major reason that net income performance was off. Another major factor was reduced Allowances for Funds Used During Construction, the result of big construction programs ending. Companies that showed large net income increases generally were recovering from a poor income production year in 1987.

In the following tables, an asterisk following a company name signifies either that the company is a holding company or operates diversified non-utility subsidiaries. In the Earnings table below, asterisks also appear under the "% Change from 1987" column, signifying recoveries from negative earnings a year earlier that are not statistically valid percentages and therefore are not given. In retrospect, these probably should not have been listed at the bottom of the chart since they represent positive achievements, but should have been shown separately without ranking. Apologies to those listed in this manner.

Although *EL&P*'s editorial team makes every attempt to obtain data from all of the Top 100 electric utilities, some utilities cannot, or will not provide data. The problem utility this year was Public Service Co. of New Mexico, which refused to provide data despite letters, mailgrams and numerous phone calls. As a result our report lists 100 companies, but is able to provide data on only 99. *EL&P* apologizes for this omission.

Customers served increased

Total electric customers served by the Top 100 electric utilities increased by 1.8 percent in 1988, to 80.7 million. Gas customers served also increased in 1988, gaining 1.3 percent to 17.6 million after declining a year earlier.

Nevada Power Co. posted the highest individual customer increase, gaining 7.6 percent.

The second largest customer gain occurred in Southern California, served by San Diego Gas & Electric Co., which enjoyed 4.3-percent customer growth. Surprisingly, Commonwealth Energy Services, in New England, ranked third with a customer increase of 3.9 percent.

On a broader basis, largest electric customer growth took place in the Southwest and Northwest, the Southeast and in other parts of Northern New England.

Kilowatthour sales strong

Last year marked the strongest sales year for the Top 100 since years immediately following the Arab Oil Embargo. For the first time since the mid-1970s sales increased more than 5.0 percent, 5.3 percent to be more accurate, to 2.18 trillion kWh, 100 billion kWh higher than in 1987, and an all-time high.

A year earlier, kWh sales were under 2.07 trillion kWh, but represented a sales increase of 3.8 percent, until this year, the highest since 1982.

Certainly the hot weather that engulfed much of the U.S. for long periods last summer had a marked effect on sales. Weather experts last year seemed to call each extended period of 90°F and 100°F temperatures a once-in-a-hundred-year event. Air conditioners hummed and meters spun. Residential sales, collectively, gained 5.0 percent.

Commercial and small light and power customer sales increased even more, again testifying to the heat, but also to the generally strong economy. Commercial/small L&P customer sales increased 6.07, approaching the historic growth rates of the early 1970s, and totalled 558.2 billion kWh.

Industrial/large L&P customer sales also reflected the strength of the economy as they grew 4.73 percent to 676.0

EARNINGS TABLE

Company	Rank	% Change From 1987	1988 Earnings Per Share, $	1987 Earnings Per Share, $
Northern Indiana Public Service	1	166.04	1.41	0.53
Interstate Power	2	151.19	2.11	0.84
TNP Enterprises* (Tex-NM Power)	3	115.35	5.19	2.41
Iowa Southern*	4	109.87	3.19	1.52
Cincinnati Gas & Electric	5	78.51	4.32	2.42
Southern Company*	6	41.67	2.72	1.92
Hawaiian Electric*	7	31.82	2.90	2.20
Citicorp*	8	31.35	3.31	2.52
Central Illinois Public Service	9	25.00	2.35	1.88
American Electric Power*	10	24.62	3.24	2.60
MDU Resources Group	11	23.97	1.81	1.46
Kansas Gas & Electric	12	22.09	2.10	1.72
Utilicorp United	13	20.73	1.96	1.64
Otter Tail Power	14	20.00	1.92	1.60
Midwest Energy*	15	19.61	1.83	1.53
CMS Energy*	16	16.14	3.31	2.85
DPL*	17	15.77	3.01	2.60
Middle South Utilities*	18	15.52	2.01	1.74
General Public Utilities*	19	15.29	4.75	4.12
Southern Indiana Gas & Electric	20	15.18	2.96	2.57
Southwestern Public Service	21	14.68	2.50	2.18
Kentucky Utilities	22	12.79	1.94	1.72
Pennsylvania Power & Light	23	12.35	3.73	3.32
Oklahoma Gas & Electric	24	12.28	3.20	2.85
Duke Power	25	11.59	4.91	4.40
Consolidated Edison	26	11.54	4.93	4.42
IPALCO Enterprises*	27	10.92	2.64	2.38
Louisville Gas & Electric	28	10.78	3.70	3.34
FPL Group* (FP&L)	29	10.32	3.42	3.10
Washington Water Power	30	9.96	2.54	2.31
Commonwealth Energy System*	31	9.37	3.50	3.20
TECO Energy*	32	9.23	2.13	1.95
Pacificorp	33	8.81	3.46	3.18
Wisconsin Public Service	34	8.06	2.28	2.11
Orange & Rockland Utilities	35	7.43	3.18	2.96
Wisconsin Energy*	36	7.06	2.73	2.55
Kansas City Power & Light	37	6.31	3.20	3.01
Delmarva Power & Light	38	6.25	1.70	1.60
Wisconsin Power & Light	39	4.81	2.18	2.08
Empire District Electric	40	3.39	3.05	2.95
Northern States Power	41	3.32	3.11	3.01
Southern California Edison	42	2.95	3.49	3.39
Madison Gas & Electric	43	2.76	2.98	2.90
Central Maine Power	44	2.23	1.83	1.79
Central Louisiana Electric	45	1.99	3.59	3.52
Northeast Utilities*	46	1.90	2.15	2.11
Potomac Electric Power	47	1.42	2.14	2.11
St. Joseph Light & Power	48	1.30	2.34	2.31
Public Service Enterprise Group*	49	0.78	2.57	2.55
Duquesne Light	50	0.54	1.86	1.85
Puget Sound Power & Light	51	0.47	2.14	2.13
Minnesota Power	52	0.43	2.35	2.34
Baltimore Gas & Electric	53	0.00	3.47	3.47
Philadelphia Electric	54	0.00	2.33	2.33
Dominion Resources*	55	-0.44	4.52	4.54
Entech	56	-1.48	1.33	1.35
IE Industries*	57	-2.02	2.43	2.48
Allegheny Power System*	58	-2.22	3.96	4.05
Sierra Pacific Power	59	-2.46	1.98	2.03
San Diego Gas & Electric	60	-3.05	3.18	3.28
Iowa-Illinois Gas & Electric	61	-3.67	4.20	4.36
Florida Progress* (FPC)	62	-5.88	3.52	3.74
SCANA Corporation* (SCE&G)	63	-6.25	3.00	3.20
Tucson Electric Power	64	-7.13	4.95	5.33
Green Mountain Power	65	-8.37	2.41	2.63
KPL Gas Service	66	-8.54	2.25	2.46
Atlantic Energy*	67	-9.93	3.63	4.03
Houston Industries*	68	-10.70	3.34	3.74
Centel*	69	-11.25	2.13	2.40
Nevada Power	70	-11.44	1.78	2.01
Union Electric	71	-12.03	2.56	2.91
Texas Utilities*	72	-12.09	4.00	4.55
Central & South West*	73	-12.50	3.43	3.92
Portland General*	74	-13.86	2.11	2.45
Pinnacle West Capital*	75	-15.23	3.34	3.94
Eastern Utilities Associates*	76	-17.63	2.85	3.46
Boston Edison	77	-18.06	1.86	2.27
Idaho Power	78	-19.02	1.32	1.63
Iowa Resources*	79	-19.02	1.49	1.84
Public Service of Colorado	80	-29.84	2.14	3.05
Commonwealth Edison	81	-36.63	3.01	4.75
Illinois Power	82	-42.93	2.14	3.75
Carolina Power & Light	83	-47.69	2.04	3.90
Ohio Edison	84	-49.17	1.22	2.40
Public Service of Indiana	85	-54.90	1.84	4.08
El Paso Electric	86	-61.54	0.35	0.91
Gulf States Utilities	87	-77.58	0.37	1.65
Pacific Gas & Electric	88	-93.46	0.10	1.53
Centerior Energy*	89	-118.79	-0.53	2.82
New England Electric*	90	-130.42	-0.94	3.09
Detroit Edison	91	-189.85	-2.82	3.25
Long Island Lighting	92	-882.66	-10.06	1.73
Rochester Gas & Electric	93	*	2.25	-5.95
United Illuminating	94	*	4.85	-0.24
Central Hudson Gas & Electric	95	*	2.63	-8.12
Niagara Mohawk Power	96	*	1.21	-4.78
Central Vermont Public Service	97	*	2.58	-2.56
Public Service of New Hampshire	98	*	1.14	-14.16
New York State Electric & Gas	99	*	2.81	-3.46
Public Service of New Mexico	100	NA	NA	NA

SALES DATA

Company	Rank	1988 Total Sales (KWH) % Increase	Average Annual Growth 1983 - 1987	1988 Sales (KWH) By Type of Customer (% of Sales) Resid.	Comm.	Indus.	Other	Average Annual Residential Use 1988	1987	Ratio of Long-Term Debt to Net Plant 1988	1987
TECO Energy*	1	45.87	-3.82	39.97	30.69	22.12	7.21	12,943	12,646	33.44	33.91
Utilicorp United	2	44.34	10.63	38.91	22.30	17.67	21.12	10,472	7,499	44.05	41.99
Midwest Energy	3	23.57	2.79	26.50	20.44	23.51	29.56	7,870	7,374	41.29	43.25
Tucson Electric Power	4	23.25	8.50	25.46	15.18	31.76	27.60	8,646	8,404	63.16	65.11
Commonwealth Energy System*	5	20.49	5.35	24.66	25.79	6.51	43.04	6,843	6,529	26.53	30.81
Ohio Edison	6	20.11	4.41	21.38	16.98	27.67	33.98	8,425	8,140	41.37	39.05
Wisconsin Energy*	7	19.45	2.65	25.77	23.43	39.37	11.43	7,925	7,603	54.10	44.38
Southern Indiana Gas & Electric	8	18.95	0.60	21.01	17.28	33.29	28.41	11,669	11,518	40.98	38.85
Allegheny Power System*	9	18.87	2.47	19.06	11.08	28.32	41.54	9,850	9,560	41.60	42.43
IPALCO Enterprises*	10	12.70	2.84	30.51	20.78	41.65	7.06	11,010	10,525	39.22	39.45
Minnesota Power	11	12.16	3.54	8.51	8.22	70.74	12.52	8,486	8,004	53.92	54.19
Otter Tail Power	12	11.04	-2.54	27.41	14.77	36.36	21.45	10,183	9,280	29.90	30.17
San Diego Gas & Electric	13	10.43	3.80	35.72	36.14	19.77	8.36	5,420	5,341	40.14	42.01
Northern States Power	14	9.97	2.33	26.16	14.32	43.06	16.47	7,577	7,157	33.06	32.32
Pinnacle West Capital*	15	9.77	3.16	33.69	34.91	18.26	13.14	10,945	10,684	43.87	44.81
Kentucky Utilities	16	8.55	4.36	28.87	19.64	17.54	33.95	11,925	11,517	36.17	35.66
Florida Progress* (FPC)	17	8.41	2.14	42.35	24.80	14.09	18.77	11,754	11,356	27.98	31.98
Sierra Pacific Power	18	8.32	3.50	30.23	39.07	27.27	3.43	7,445	7,260	41.37	41.35
Interstate Power	19	8.30	1.23	22.71	17.85	53.29	6.15	7,872	7,447	43.64	44.68
Northern Indiana Public Service	20	8.12	1.19	18.83	18.82	59.91	2.44	7,286	7,083	41.16	43.59
Long Island Lighting	21	7.78	2.40	42.37	0.00	52.00	5.63	7,905	7,568	49.31	44.59
St. Joseph Light & Power	22	7.59	1.65	39.83	29.10	30.03	1.04	9,835	9,074	36.91	39.63
Southwestern Public Service	23	7.59	4.37	13.35	14.28	36.76	35.61	7,924	7,757	40.06	39.83
Iowa Resources*	24	7.42	1.57	36.58	26.15	33.83	3.44	9,150	8,560	50.45	42.09
Puget Sound Power & Light	25	7.38	1.03	47.30	29.78	19.13	3.79	13,213	12,758	56.85	57.53
Public Service of New Hampshire	26	7.15	1.90	32.06	14.85	31.22	21.86	7,338	7,181	56.77	56.77
DPL*	27	7.07	4.89	31.76	19.48	27.60	21.16	10,858	10,233	54.09	57.67
Duquesne Light	28	6.95	3.80	21.92	35.10	22.93	20.05	6,168	6,019	50.56	54.55
Citcorp*	29	6.93	2.43	31.60	23.18	44.20	1.02	9,479	8,941	36.36	36.36
Delmarva Power & Light	30	6.90	4.28	28.80	26.74	26.69	17.77	9,575	9,152	42.70	46.85
Consolidated Edison	31	6.84	1.95	27.52	66.82	4.10	1.57	3,892	3,709	36.32	37.60
Washington Water Power	32	6.79	-0.59	30.78	21.53	13.32	34.36	13,284	13,062	53.68	50.37
Central Hudson Gas & Electric	33	6.77	-1.50	28.73	25.95	32.59	12.73	7,059	6,738	54.72	84.45
Centerior Energy*	34	6.67	2.17	24.63	23.41	45.53	6.44	7,462	7,217	54.02	52.64
American Electric Power*	35	6.66	-1.15	24.63	16.85	37.37	21.15	10,962	10,526	49.63	50.47
IE Industries*	36	6.48	0.34	32.22	26.01	33.58	8.19	8,608	8,119	39.22	29.01
El Paso Electric	37	6.45	1.28	29.32	32.89	16.42	21.37	6,025	5,846	50.63	64.00
General Public Utilities*	38	6.32	2.96	34.61	28.70	33.29	3.40	8,322	7,938	34.93	35.59
Baltimore Gas & Electric	39	6.23	4.72	38.35	15.81	45.84	0.00	10,362	9,837	39.59	41.50
MDU Resources Group	40	6.13	-0.82	40.08	19.05	37.13	3.74	7,926	7,256	45.65	47.19
Commonwealth Edison	41	6.01	2.05	28.51	29.88	30.19	11.42	7,160	6,756	36.62	35.88
Iowa Southern*	42	6.00	3.78	36.63	17.29	37.97	8.11	8,855	8,241	37.85	37.75
Central Vermont Public Service	43	5.98	5.04	29.65	25.31	12.85	32.18	8,108	8,050	42.42	50.11
Wisconsin Public Service	44	5.86	3.48	24.38	23.89	30.36	21.38	7,616	7,294	38.35	38.82
FPL Group* (FP&L)	45	5.83	3.29	50.23	39.92	6.90	2.95	11,490	11,243	36.04	36.79
Madison Gas & Electric	46	5.83	0.34	28.98	55.29	6.03	9.70	6,768	6,400	44.73	44.18
Entech	47	5.74	-2.01	19.67	20.60	30.08	29.65	8,482	8,377	46.74	48.07
KPL Gas Service	48	5.67	2.17	23.42	28.38	19.15	29.05	8,916	8,320	35.50	32.43
Public Service of Indiana	49	5.63	1.42	28.54	22.88	33.36	15.22	11,356	10,713	44.55	40.27
Philadelphia Electric	50	5.55	2.15	31.20	14.47	51.23	3.10	7,807	7,427	50.50	49.91
Orange & Rockland Utilities	51	5.54	1.54	34.54	22.97	31.35	11.14	7,079	6,703	41.44	42.71
Hawaiian Electric*	52	5.46	2.61	27.54	26.00	45.71	0.75	7,195	7,114	32.40	34.92
Empire District Electric	53	5.45	5.41	27.85	20.17	17.51	34.47	10,573	10,071	39.44	33.29
Pacificorp	54	5.30	1.12	22.63	19.67	38.05	19.65	10,070	9,780	48.30	51.23
New England Electric*	55	5.22	3.19	37.24	34.32	24.38	4.07	7,077	6,776	53.87	48.95
Nevada Power	56	5.14	5.99	43.05	19.88	31.55	5.51	13,771	13,468	55.38	52.57
Public Service Enterprise Group*	57	5.05	2.57	27.25	43.96	27.45	1.35	6,271	5,939	38.31	36.64
Rochester Gas & Electric	58	5.01	0.81	27.93	24.39	25.44	22.24	7,124	6,940	52.51	57.32
Cincinnati Gas & Electric	59	4.96	3.28	35.41	25.67	28.81	10.11	11,190	10,699	42.96	46.88
Potomac Electric Power	60	4.88	3.94	26.38	42.10	21.44	10.08	10,812	10,526	41.18	41.26
Boston Edison	61	4.88	-0.57	24.08	49.17	12.91	13.83	6,270	5,903	46.55	47.11
Pennsylvania Power & Light	62	4.85	7.94	29.19	23.49	26.06	21.26	10,059	9,565	38.99	38.82
Atlantic Energy*	63	4.79	3.97	43.71	37.30	18.22	0.77	8,480	8,281	37.84	41.11
Central Maine Power	64	4.77	4.03	34.29	24.11	39.85	1.75	7,354	7,196	58.26	64.37
Louisville Gas & Electric	65	4.62	1.80	32.37	27.10	28.86	11.67	10,467	10,282	35.00	37.42
Public Service of Colorado	66	4.56	3.45	28.22	50.45	16.49	4.84	6,403	6,258	38.66	38.21
Northeast Utilities*	67	4.30	2.99	38.55	35.17	22.67	3.60	8,418	8,061	48.53	46.82
Portland General*	68	4.23	3.00	34.55	28.37	19.40	17.68	12,343	11,751	47.59	48.93
Kansas City Power & Light	69	3.99	2.50	31.82	44.56	21.81	1.81	9,259	8,917	42.59	46.02
Central & South West*	70	3.90	-0.36	29.56	24.56	30.70	15.17	10,814	10,464	35.16	34.70
Texas Utilities*	71	3.80	4.80	32.99	28.72	27.61	10.67	13,498	13,147	43.86	41.28
Detroit Edison	72	3.71	3.03	26.62	20.29	46.58	4.50	6,866	6,635	51.04	48.47
Carolina Power & Light	73	3.62	3.49	28.22	16.78	31.73	23.27	12,571	12,567	40.17	36.70
Southern California Edison	74	3.58	1.89	30.79	33.34	32.30	3.58	6,254	6,117	46.91	43.77
Union Electric	75	3.50	2.36	33.16	33.34	28.04	5.46	10,645	10,390	42.65	45.51
Iowa-Illinois Gas & Electric	76	3.44	1.13	27.04	27.54	42.57	2.86	7,192	6,861	40.81	40.47
TNP Enterprises* (Tex-NM Power)	77	3.38	1.49	30.40	21.26	46.03	2.32	11,030	10,668	32.63	35.47
United Illuminating	78	3.26	2.18	35.34	41.08	22.42	1.16	6,804	6,562	56.36	55.43
Eastern Utilities Associates*	79	3.24	2.59	28.82	29.06	17.73	24.39	6,277	5,996	54.37	52.93
Pacific Gas & Electric	80	2.97	1.53	32.92	34.90	23.26	8.92	6,537	6,489	50.58	53.28
Central Louisiana Electric	81	2.83	-0.03	39.53	18.19	34.78	7.50	12,164	11,873	38.11	41.23
CMS Energy*	82	2.82	2.83	31.77	26.78	37.58	3.87	7,300	7,200	51.82	54.08
Green Mountain Power	83	2.82	9.09	26.45	25.91	21.89	25.96	9,011	8,802	36.26	39.69
Illinois Power	84	2.56	0.71	26.00	18.68	47.14	6.13	23,528	22,486	49.28	48.82
Centel*	85	2.47	-0.94	29.92	31.20	21.42	17.46	7,057	6,684	0.00	0.00
Duke Power	86	2.23	3.91	25.29	20.60	38.00	16.11	12,614	12,830	37.01	39.37
Gulf States Utilities	87	2.16	-1.64	23.26	18.47	44.39	13.88	13,029	12,818	49.83	50.72
Houston Industries*	88	2.15	0.25	26.75	20.17	49.86	3.21	13,025	12,812	36.89	34.40
Central Illinois Public Service	89	2.11	-3.13	33.41	13.08	47.21	6.30	9,407	8,972	38.71	39.43
Oklahoma Gas & Electric	90	1.91	-2.03	31.88	22.51	28.47	17.14	11,194	11,264	39.28	36.31
Kansas Gas & Electric	91	1.84	1.84	27.10	21.37	36.44	15.09	9,726	9,314	46.28	53.17
Wisconsin Power & Light	92	1.83	3.44	27.27	16.28	32.74	23.70	8,684	8,236	37.81	39.31
Dominion Resources*	93	1.60	5.02	36.47	29.12	16.45	17.96	13,006	12,857	46.21	47.54
New York State Electric & Gas	94	1.21	6.82	30.88	18.41	18.95	31.77	7,791	7,589	57.50	63.25
SCANA Corporation* (SCE&G)	95	1.00	3.73	32.44	27.23	31.60	8.74	12,805	12,966	37.14	38.76
Middle South Utilities*	96	0.76	2.86	29.54	20.99	36.65	12.82	11,671	11,693	55.69	52.89
Idaho Power	97	-0.71	-3.45	27.99	15.92	30.73	25.37	14,364	13,785	39.16	40.12
Niagara Mohawk Power	98	-1.93	0.55	28.86	31.95	33.56	5.63	7,626	7,382	52.85	51.61
Southern Company*	99	-2.21	1.28	23.72	20.64	33.38	22.26	11,255	11,307	51.18	52.64
Public Service of New Mexico	100	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

Rank '88	Rank '87	Company	KWH Sales (billions)	'88% Change
1	1	Southern Company*	130.9	-2.21
2	2	American Electric Power*	104.7	6.66
3	3	Texas Utilities*	80.7	3.80
4	4	Commonwealth Edison	71.5	6.01
5	5	Pacific Gas & Electric	68.5	2.97
6	6	Southern California Edison	67.9	3.58
7	7	Duke Power	66.2	2.23
8	8	FPL Group* (FP&L)	59.9	5.83
9	9	Middle South Utilities*	58.1	0.76
10	10	Houston Industries*	57.1	2.15

billion kWh.

Sales to other customers, including those for resale, rose 5.7 percent, to 282 billion kWh.

It was, overall, the best sales year in well over a decade.

Ninety-six of the 99 companies reporting to *EL&P* enjoyed kWh sales increases last year, compared with 84 a year ago. In addition, 26 companies reported gains greater than the historic 7-percent growth level of pre-Embargo days.

Largest gains were posted by TECO, the parent of Tampa Electric Co., which boosted sales almost 46 percent in 1988 after a below-average 3.5-percent gain in 1987. Runners up were Utilicorp United Inc., with a gain of 44.3 percent in 1988 after leading the Top 100 in 1987 with a 35.6-percent increase.

Median kWh sales growth was 5.5 percent, up from 4.0 percent in 1987, and reflects the fourth consecutive year of median increase. For comparison purposes, median sales growth in 1986 was 1.9 percent.

The largest sellers of electricity ranked the same in 1988 as they did in 1987. Leader Southern Company reported a 2.2-percent decline to 130.9 billion kWh in sales; of the remaining companies in the top 10, all recorded increases. AEP's 6.7-percent improvement was the largest.

Average residential usage increased in 1988 to a record 9398 kWh, surpassing the previous record of 8928 kWh set last year. The 5.3-percent gain reflected the effect of the prolonged heat during last summer. But the new record represents a gain of only 693 kWh, or just 8.0 percent in the last decade.

Highest average residential kWh use took place, as usual, in the Pacific Northwest (where low hydro-based rates have encouraged all-electric living), Texas (where searing heat is usual for extended periods) and the Southeast (where high humidity is common). Kilowatthour leaders were: 1. Idaho Power, 14,364; 2. Nevada Power, 13,771; 3. Texas Utilities, 13,498; 4. Washington Water Power, 13,284; 5. Puget Sound Power & Light, 13,213; 6. Gulf States Utilities, 13,029; 7. Houston Industries, 13,025; 8. Dominion Resources, 13,008; 9. TECO Energy, 12,943 and 10. SCANA Corp., 12,805.

Revenues Increased

Total revenues for the Top 100 Electric Utilities increased in 1988 by 4.8 percent, to $157.3-billion. Last year, total revenues of the Top 100 were $150.0 billion.

This $157.3-billion total recorded in 1988 is a new record, wiping out the previous high of $150.1 billion posted by the Top 100 in 1985.

Total revenues reported by the Top 100 include returns from all activities for holding companies and utilities with non-utility subsidiaries.

Obviously, the strength of kilowatt-

TABLE II
THE TOP 10 TOTAL REVENUES

Rank '88	Rank '87	Company	'88 $ Revenues (millions)	'88% Change
1	1	Pacific Gas & Electric	7,646	6.40
2	2	Southern Company*	7,235	0.70
3	4	Southern California Edison	6,253	11.62
4	7	FPL Group* (FP&L)	5,854	6.79
5	3	Commonwealth Edison	5,613	-1.07
6	5	Consolidated Edison	5,109	0.28
7	6	American Electric Power*	4,841	1.11
8	8	Public Service Enterprise Group*	4,395	4.36
9	9	Texas Utilities*	4,154	1.73
10	11	Houston Industries*	3,649	0.59

hour sales, buoyed by last year's extended super-hot weather and continued strong business and economic activity, was a major factor in pushing revenues up solidly. Also, a number of unregulated, non-utility activities finally got into stride and began to provide solid returns to their parents.

Rate increases—a substantial factor in revenue growth over the past few years—played a lesser role in 1988.

Revenues from electric operations only totalled $152.8 billion, which was 4.3 percent ahead of electric operation revenues in 1987, $146.5 billion.

Non-utility operations contributed $4.5 billion to 1988 revenues of utility organizations. Last year, non-utility operations contributed $4.0 billion.

Ninety companies reported revenue increases in 1988, compared with just over half the Top 100 utilities in 1987. Median growth was 4.36 percent, well above 1987's 0.5 percent.

The largest revenue gain was posted by Ohio Edison, 20.4 percent, substantially better than its 30th position performance in 1987. Duquesne Light, 23rd in 1987, ranked 2nd in 1988 at 19.7 percent. Other high-growth revenue producers included Iowa Southern Utilities, 3rd at 16.4 percent; Hawaiian Electric, 4th at 15.4 percent and Tucson Electric Power, 5th at 15.1 percent.

At the other end of the scale, utilities reporting the poorest revenue production performance were Dominion Resources, 99th at -4.7 percent; SCANA Corp., 98th at -2.9 percent; Public Service of Indiana, 97th at -2.5 percent; Duke Power, 96th at -2.1 percent; Portland General Electric, 95th at -1.5 percent and Central Louisiana Electric, 93rd at -1.1 percent. Public Service of New Mexico was listed 100th because it did not provide any data.

Among the industry's largest revenue producers there were several changes. PG&E and Southern Company held their positions as 1st and 2nd, respectively. Southern California Edison climbed from 4th to 3rd replacing Commonwealth Edison, which fell to 5th. Consolidated Edison, 5th in 1987, fell to 6th in 1988, pushing American Electric Power down to 6th. Public Service Enterprises and Texas Utilities held on to their 8th and 9th rankings, respectively. Houston Industries moved from 11th in 1987 to 10th last year, dropping Duke Power from the Top 10.

Net income fell

Net income available for common stock fell 10.3 percent in 1988 from the 1987 level, the second straight year of declines.

As a matter of fact, 1986 was the only year of the past three to reflect positive income growth for the Top 100.

Overall, income for the 99 companies

FINANCIAL STATISTICS

Company	Net Income Rank	Net Income % Gain	Revenue Rank	Revenue % Gain	Sales (KWH) Rank	Sales (KWH) % Gain	Int. Cov. Ratio 1988	Int. Cov. Ratio 1987	Earnings Per Share $ 1988	Price/Share 1988 (Dollars) High	Price/Share 1988 (Dollars) Low	% Change Long-Term Debt '87-'88
Northern Indiana Public Service	1	166.10	46	5.00	20	8.12	0.77	0.26	1.41	14.125	8.625	-6.64
Interstate Power	2	152.67	51	4.36	19	8.30	1.04	0.44	2.11	31.625	19.375	-3.24
TNP Enterprises* (Tex-NM Power)	3	123.29	82	1.47	77	3.38	1.24	1.20	5.19	20.500	18.125	-0.52
Iowa Southern*	4	110.58	3	16.38	42	6.00	2.18	0.47	3.19	29.250	25.250	-0.41
Cincinnati Gas & Electric	5	87.34	75	2.10	59	4.96	2.17	1.09	4.32	29.000	24.375	2.14
Southern Company*	6	46.62	88	0.70	99	-2.21	1.00	0.69	2.72	24.250	20.375	1.15
Hawaiian Electric*	7	45.49	4	15.37	52	5.46	1.58	1.09	2.90	33.630	25.880	0.23
MDU Resources Group	8	44.59	68	2.94	40	6.13	0.64	0.47	1.81	20.125	17.125	-3.11
Utilicorp United	9	40.08	9	13.10	2	44.34	0.99	0.83	1.98	19.590	14.140	12.70
Cilcorp*	10	30.91	63	3.60	29	6.93	1.74	1.68	3.31	34.750	29.500	-0.02
Central Illinois Public Service	11	25.07	52	4.29	89	2.11	1.98	1.61	2.35	23.500	19.875	-2.34
American Electric Power*	12	24.75	85	1.11	35	6.66	1.16	0.92	3.24	29.750	25.875	1.77
Otter Tail Power	13	20.05	30	6.72	12	11.04	2.22	1.62	1.92	22.250	18.250	-2.14
Midwest Energy*	14	19.18	35	6.04	3	23.57	1.21	1.04	1.83	20.000	16.625	-3.66
Southern Indiana Gas & Electric	15	15.66	10	12.96	8	18.95	1.83	1.73	2.96	30.125	25.875	6.60
DPL*	16	15.55	43	5.39	27	7.07	1.66	1.36	3.01	27.625	23.250	0.14
Southwestern Public Service	17	14.79	67	2.97	23	7.59	1.95	1.68	2.50	28.000	22.130	-0.30
Louisville Gas & Electric	18	13.31	58	4.01	65	4.62	1.67	1.46	3.70	35.625	30.250	1.44
Kentucky Utilities	19	12.65	86	1.10	16	8.55	2.00	1.77	1.94	20.625	17.500	-0.02
CMS Energy*	20	11.70	41	5.77	82	2.82	1.34	1.02	3.31	26.500	13.500	-2.62
Duke Power	21	11.46	96	-2.13	86	2.23	2.18	1.93	4.91	49.000	42.250	0.20
FPL Group* (FP&L)	22	11.15	28	6.79	45	5.83	1.42	1.39	3.42	32.500	27.750	-1.06
Commonwealth Energy System*	23	1.11	53	4.29	5	20.49	1.08	1.21	3.50	32.875	26.500	-3.67
IPALCO Enterprises*	24	10.86	14	10.06	10	12.70	1.79	1.61	2.64	24.375	21.250	-0.54
Oklahoma Gas & Electric	25	10.83	66	3.16	90	1.91	1.93	1.65	3.20	33.750	28.500	7.75
Washington Water Power	26	10.40	13	10.16	32	6.79	1.00	0.92	2.54	28.375	23.375	5.22
Pennsylvania Power & Light	27	9.78	38	5.92	62	4.85	1.13	0.99	3.73	37.875	33.125	1.79
Consolidated Edison	28	9.64	90	0.28	31	6.84	2.61	2.43	4.93	47.500	40.875	1.32
General Public Utilities*	29	9.53	37	6.01	38	6.32	1.74	1.68	4.75	38.500	27.250	2.50
Kansas Gas & Electric	30	9.33	72	2.31	91	1.84	0.77	0.69	2.10	21.750	18.125	-14.27
Wisconsin Energy*	31	8.05	11	12.91	7	19.45	2.26	2.10	2.73	27.875	22.500	20.54
Orange & Rockland Utilities	32	7.95	25	7.84	51	5.54	1.40	1.44	3.18	33.500	27.875	0.76
Wisconsin Public Service	33	7.76	57	4.11	44	5.86	2.30	2.37	2.28	23.375	20.000	0.55
Delmarva Power & Light	34	6.64	26	7.84	30	6.90	1.33	1.29	1.70	19.250	16.500	-4.39
Kansas City Power & Light	35	6.31	48	4.50	69	3.99	1.09	0.98	3.20	32.250	24.875	-7.54
Northern States Power	36	6.28	6	13.34	14	9.97	2.12	2.14	3.11	34.250	29.250	2.18
Pacificorp	37	6.19	61	3.89	54	5.30	1.14	1.12	3.46	37.000	32.500	-6.15
Empire District Electric	38	5.67	70	2.44	53	5.45	2.02	2.16	3.05	31.875	27.500	28.25
Minnesota Power	39	5.41	24	8.05	11	12.16	1.61	1.64	2.35	26.500	21.000	4.09
Wisconsin Power & Light	40	5.40	18	9.38	92	1.83	2.04	1.89	2.18	23.875	21.375	-0.10
Madison Gas & Electric	41	4.88	36	6.03	46	5.83	1.51	1.52	2.98	32.750	30.000	6.83
Philadelphia Electric	42	4.58	81	1.49	50	5.55	1.10	1.14	2.33	21.250	16.880	7.16
Potomac Electric Power	43	4.11	84	1.33	60	4.88	1.89	1.94	2.14	24.000	19.250	6.48
Puget Sound Power & Light	44	3.87	23	8.50	25	7.38	1.38	1.26	2.14	20.250	18.000	-0.21
TECO Energy*	45	3.25	31	6.56	1	45.87	2.42	2.01	2.13	24.875	21.250	-0.05
Southern California Edison	46	3.15	12	11.62	74	3.58	1.33	1.52	3.49	34.500	29.125	7.02
Middle South Utilities*	47	2.93	64	3.20	96	0.76	1.07	1.13	2.01	16.125	8.500	4.08
Central Louisiana Electric	48	2.24	94	-1.09	81	2.83	1.29	1.26	3.59	33.875	30.750	-5.82
Northeast Utilities*	49	2.08	17	9.54	67	4.30	1.22	1.36	2.15	23.125	18.250	5.04
Public Service Enterprise Group*	50	1.56	50	4.36	57	5.05	1.60	1.56	2.57	26.875	22.000	5.93
Entech	51	1.27	45	5.02	47	5.74	0.61	0.60	1.33	37.000	30.250	-1.84
St. Joseph Light & Power	52	0.30	87	0.99	22	7.59	2.25	2.13	2.34	24.500	19.000	-7.75
IE Industries*	53	0.23	33	6.17	36	6.48	1.37	1.49	2.43	25.000	22.500	37.76
Baltimore Gas & Electric	54	0.13	83	1.47	39	6.23	2.34	2.31	3.47	33.750	29.375	-0.43
Sierra Pacific Power	55	-0.55	8	13.17	18	8.32	1.13	1.19	1.98	23.750	20.875	6.91
Allegheny Power System*	56	-0.92	16	9.55	9	18.87	1.50	1.54	3.96	41.500	35.875	-1.14
Central Maine Power	57	-1.45	59	3.95	64	4.77	0.99	1.03	1.83	18.875	15.500	13.77
Atlantic Energy*	58	-2.16	55	4.27	63	4.79	1.43	1.54	3.63	35.000	30.750	-1.96
San Diego Gas & Electric	59	-2.95	21	9.03	13	10.43	1.74	1.78	3.18	39.500	30.000	-2.08
Iowa-Illinois Gas & Electric	60	-3.70	62	3.74	76	3.44	1.83	1.96	4.20	41.500	33.750	-0.83
Florida Progress* (FPC)	61	-4.26	73	2.27	17	8.41	1.85	1.68	3.52	37.750	32.000	-11.81
Dominion Resources*	62	-5.46	99	-4.73	93	1.60	1.27	1.32	4.52	47.250	40.875	1.77
Texas Utilities*	63	-5.49	79	1.73	71	3.80	1.34	1.80	4.00	30.625	24.625	23.36
Tucson Electric Power	64	-5.65	5	15.10	4	23.25	3.07	2.95	4.95	59.880	48.750	-1.67
SCANA Corporation* (SCE&G)	65	-6.30	98	-2.93	95	1.00	1.51	1.80	3.00	33.625	28.500	-1.26
Green Mountain Power	66	-7.75	92	-0.92	83	2.82	1.94	2.17	2.41	26.750	22.000	-1.78
KPL Gas Service	67	-8.44	91	-0.03	48	5.67	1.55	1.66	2.25	26.875	22.000	12.74
Houston Industries*	68	-9.13	89	0.59	88	2.15	1.83	2.63	3.34	33.875	26.625	12.82
Nevada Power	69	-9.95	20	9.12	56	5.14	1.52	1.76	1.78	22.250	18.375	8.96
Union Electric	70	-12.11	56	4.25	75	3.50	1.31	1.30	2.56	25.000	21.375	-7.18
Duquesne Light	71	-12.16	2	19.73	28	6.95	0.75	0.79	1.86	18.875	11.750	-8.30
Central & South West*	72	-12.90	69	2.82	70	3.90	1.44	1.90	3.43	34.750	29.500	4.32
Portland General*	73	-13.91	95	-1.49	68	4.23	1.30	1.26	2.11	24.750	20.625	-3.81
Eastern Utilities Associates*	74	-13.94	77	1.91	79	3.24	0.43	0.60	2.85	33.125	21.125	15.72
Centel*	75	-14.08	71	2.42	85	2.47	NA	NA	2.13	52.250	34.250	ERR
Pinnacle West Capital*	76	-16.39	27	7.81	15	9.77	1.17	1.80	3.34	29.750	15.000	-1.71
Boston Edison	77	-16.83	78	1.83	61	4.88	0.83	1.17	1.86	18.750	12.500	17.49
Idaho Power	78	-18.90	49	4.49	97	-0.71	0.85	1.02	1.32	25.375	19.500	-1.87
Iowa Resources*	79	-19.55	76	2.04	24	7.42	1.29	1.52	1.49	22.000	15.250	22.68
Public Service of Colorado	80	-29.94	80	1.68	66	4.56	1.12	1.80	2.14	23.125	19.500	2.64
Commonwealth Edison	81	-35.27	93	-1.07	41	6.01	0.97	1.45	3.01	33.375	22.750	2.13
Illinois Power	82	-39.69	44	5.35	94	2.56	0.72	1.24	2.14	25.125	16.500	-2.47
Carolina Power & Light	83	-47.84	19	9.20	73	3.62	0.64	1.38	2.04	37.625	31.750	6.83
Ohio Edison	84	-48.95	1	20.40	6	20.11	0.57	1.00	1.22	21.000	17.250	1.13
Public Service of Indiana	85	-54.80	97	-2.54	49	5.63	1.07	1.94	1.84	14.250	11.250	11.76
Gulf States Utilities	86	-57.22	34	6.14	87	2.16	0.34	0.78	0.37	9.375	4.750	-4.78
El Paso Electric	87	-62.29	7	13.30	37	6.45	0.20	0.49	0.35	16.625	13.375	-17.91
Pacific Gas & Electric	88	-90.98	32	6.40	80	2.97	0.08	0.89	0.10	18.380	14.000	-2.88
Centerior Energy*	89	-118.95	39	5.83	34	6.67	-0.20	0.90	0.00	18.000	12.250	-4.48
New England Electric*	90	-131.44	47	4.94	55	5.22	-0.41	2.16	0.00	25.500	20.000	NA
Detroit Edison	91	-189.90	22	6.59	72	3.71	-0.90	1.07	-2.92	17.500	12.000	-9.70
Long Island Lighting	92	-682.97	65	3.17	21	7.78	-2.60	0.45	-10.08	17.125	7.125	-7.39
Niagara Mohawk Power	93	*	29	6.75	96	-1.93	0.60	-2.35	1.21	15.500	12.000	4.19
New York State Electric & Gas	94	*	60	3.92	94	1.21	0.79	-0.95	2.81	24.625	19.500	-6.09
United Illuminating	95	*	54	4.20	78	3.26	0.66	-0.03	4.85	27.250	19.125	8.76
Rochester Gas & Electric	96	*	40	5.81	58	5.01	1.04	-2.29	2.25	18.250	14.750	-6.19
Central Hudson Gas & Electric	97	*	74	2.17	33	6.77	0.94	-2.72	2.63	21.875	16.875	4.34
Central Vermont Public Service	98	*	42	5.66	43	5.98	1.34	-1.29	2.58	26.000	21.250	-9.16
Public Service of New Hampshire	99	*	15	9.90	26	7.15	0.94	-9.54	1.14	6.000	3.000	0.10
Public Service of New Mexico	100	NA	100	NA	100	NA	NA	NA	NA	NA	NA	NA

ALPHABETICAL LISTING OF COMPANY PERFORMANCE

Company	Electric Sales (KWH) (millions)	Rank	Customers Served: Electric Total	Electric % Gain	Gas Total	Gas % Gain	Revenues: Total $ (1000's)	Revenues % Electric	Revenues % Gas	Net Income After Tax $ (Thousands)
Allegheny Power System*	56,513	11	1,250,865	1.87	0	0.00	2,170,490	100.00	0.00	205,086
American Electric Power*	104,744	2	2,683,047	1.23	0	0.00	4,840,800	98.87	0.00	626,843
Atlantic Energy*	7,350	72	434,262	3.09	0	0.00	675,859	100.00	0.00	72,171
Baltimore Gas & Electric	23,981	32	991,105	2.34	518,753	0.12	1,863,668	76.98	20.47	274,037
Boston Edison	14,244	48	663,627	1.49	0	0.00	1,202,655	100.00	0.00	70,071
CMS Energy*	29,294	26	1,431,000	1.49	1,313,000	2.34	2,942,676	56.59	42.03	271,623
Carolina Power & Light	37,588	17	930,972	2.44	0	0.00	2,273,362	100.00	0.00	163,586
Centel*	2,689	94	135,886	0.03	0	0.00	1,094,890	15.20	0.00	134,008
Centerior Energy*	28,099	27	1,013,619	0.78	0	0.00	2,037,560	100.00	0.00	(73,960)
Central & South West*	47,481	13	1,531,000	0.53	0	0.00	2,512,000	96.42	2.35	324,000
Central Hudson Gas & Electric	5,217	81	243,824	1.09	52,564	-4.67	438,385	86.51	13.49	38,051
Central Illinois Public Service	7,444	70	305,924	0.23	157,196	0.41	616,188	81.06	18.94	80,148
Central Louisiana Electric	5,267	80	198,412	0.71	0	0.00	301,091	100.00	0.00	40,289
Central Maine Power	8,972	64	464,577	3.07	0	0.00	653,971	100.00	0.00	45,849
Central Vermont Public Service	3,180	93	133,916	2.97	0	0.00	220,761	98.64	0.00	17,117
Cilcorp*	4,929	82	183,981	0.66	187,175	1.01	470,907	61.81	30.37	44,822
Cincinnati Gas & Electric	18,319	38	655,751	1.69	384,921	1.65	1,385,875	72.99	27.01	206,459
Commonwealth Edison	71,542	4	3,138,389	1.34	0	0.00	5,613,338	100.00	0.00	635,276
Commonwealth Energy System*	7,248	74	334,586	3.94	220,284	2.20	688,764	63.12	35.34	33,427
Consolidated Edison	33,769	22	2,898,022	0.87	1,024,368	0.01	5,108,826	82.65	12.03	561,722
DPL*	13,563	51	444,397	1.30	274,278	0.94	1,002,378	73.94	23.90	124,677
Delmarva Power & Light	10,225	56	351,578	3.01	80,263	1.60	768,322	86.88	10.23	77,832
Detroit Edison	40,958	15	1,882,194	1.36	0	0.00	3,102,172	98.99	0.00	(428,583)
Dominion Resources*	53,216	12	1,703,000	3.34	0	0.00	3,097,579	100.00	0.00	407,011
Duke Power	66,198	7	1,565,110	2.92	0	0.00	3,626,985	100.14	0.00	497,057
Duquesne Light	14,401	47	569,061	0.62	0	0.00	1,063,233	100.00	0.00	118,566
Eastern Utilities Associates*	4,900	83	253,000	2.02	0	0.00	374,138	98.96	0.00	37,475
El Paso Electric	4,250	90	233,206	2.63	0	0.00	382,107	98.72	0.00	12,110
Empire District Electric	3,613	91	113,713	1.89	0	0.00	153,805	99.59	0.00	16,990
Entech	9,156	62	246,437	0.41	10,886	2.20	443,681	78.34	21.66	31,899
FPL Group* (FP&L)	59,892	8	3,018,502	3.84	0	0.00	5,853,513	79.45	0.00	447,787
Florida Progress* (FPC)	26,131	29	1,088,560	3.64	0	0.00	2,002,000	72.74	0.00	179,800
General Public Utilities*	38,454	16	1,816,635	1.94	0	0.00	2,833,974	99.91	0.00	283,786
Green Mountain Power	2,140	96	74,439	2.94	0	0.00	128,613	99.12	0.00	8,898
Gulf States Utilities	27,197	28	557,576	0.48	82,510	-0.59	1,520,477	93.11	4.65	103,143
Hawaiian Electric*	7,385	71	330,710	2.22	0	0.00	732,716	74.45	0.00	55,008
Houston Industries*	57,113	10	1,330,703	1.87	0	0.00	3,649,465	83.95	0.00	395,254
IE Industries*	4,704	84	206,935	0.28	121,919	-0.35	438,252	71.82	23.35	34,154
IPALCO Enterprises*	11,941	54	373,256	1.72	0	0.00	609,446	96.17	0.00	99,038
Idaho Power	11,893	55	279,538	1.19	0	0.00	412,321	100.00	0.00	44,787
Illinois Power	15,728	45	546,431	0.66	385,336	0.32	1,284,720	73.94	26.06	151,890
Interstate Power	4,312	88	156,775	0.26	45,737	0.53	274,321	78.56	21.44	19,688
Iowa Resources*	5,289	79	245,931	1.24	0	0.00	348,469	98.69	0.00	32,939
Iowa Southern*	2,054	97	93,766	0.16	38,012	0.58	137,325	73.23	24.96	18,409
Iowa-Illinois Gas & Electric	4,542	86	191,506	0.36	228,200	0.75	496,375	60.27	39.73	56,350
KPL Gas Service	9,802	59	298,653	0.51	1,057,995	1.13	1,166,114	39.55	60.45	77,821
Kansas City Power & Light	10,220	57	404,726	2.05	0	0.00	736,536	98.89	0.00	98,974
Kansas Gas & Electric	8,073	66	251,849	0.75	0	0.00	526,220	98.12	0.00	76,362
Kentucky Utilities	14,023	49	380,000	1.33	0	0.00	547,778	100.00	0.00	73,211
Long Island Lighting	16,473	43	989,097	1.25	421,429	1.40	2,137,834	83.59	16.41	(1,121,128)
Louisville Gas & Electric	9,067	63	317,617	1.28	240,897	0.99	661,107	73.17	26.61	75,572
MDU Resources Group	1,844	98	110,042	-0.41	175,558	0.05	290,273	42.08	57.92	17,238
Madison Gas & Electric	2,206	95	109,487	1.44	82,015	3.53	214,323	59.58	40.22	19,962
Middle South Utilities*	58,071	9	1,693,609	0.91	159,516	-29.04	3,565,405	97.42	2.58	794,753
Midwest Energy*	4,304	89	155,399	0.04	344,929	2.03	570,325	38.14	53.05	39,406
Minnesota Power	9,896	58	117,935	1.05	8,920	1.07	460,468	85.22	1.89	67,879
Nevada Power	7,771	68	288,982	7.58	0	0.00	409,013	100.00	0.00	47,537
New England Electric*	20,771	34	1,233,519	2.44	0	0.00	1,519,677	93.73	0.00	(53,820)
New York State Electric & Gas	16,672	42	745,000	1.92	139,000	2.21	1,340,169	88.93	11.07	157,975
Niagara Mohawk Power	34,995	20	1,482,000	1.58	458,000	1.78	2,800,453	83.69	16.31	159,657
Northeast Utilities*	24,412	30	1,223,705	1.16	171,400	0.86	2,279,491	89.14	8.78	233,922
Northern Indiana Public Service	12,755	52	372,996	1.23	577,583	2.13	1,524,184	59.28	40.72	103,449
Northern States Power	34,796	21	1,260,763	1.66	333,862	2.90	2,006,458	83.83	15.69	217,780
Ohio Edison	35,685	19	1,015,508	1.03	0	0.00	2,142,572	98.90	0.00	186,170
Oklahoma Gas & Electric	19,214	36	636,036	0.26	0	0.00	1,098,157	100.00	0.00	135,321
Orange & Rockland Utilities	4,314	87	241,303	2.13	102,449	1.97	486,705	77.68	21.64	40,298
Otter Tail Power	3,487	92	121,328	-0.28	0	0.00	178,221	100.00	0.00	23,025
Pacific Gas & Electric	68,537	5	4,026,701	1.90	3,299,844	1.69	7,645,748	72.10	27.90	62,127
Pacificorp	46,350	14	1,202,000	1.09	0	0.00	2,159,600	100.00	0.00	309,000
Pennsylvania Power & Light	33,766	23	1,122,628	2.29	0	0.00	2,213,903	99.92	0.00	332,042
Philadelphia Electric	32,239	24	1,437,357	1.44	332,740	2.28	3,228,712	88.28	11.72	468,765
Pinnacle West Capital*	16,213	44	582,003	2.76	0	0.00	1,416,049	100.00	0.00	237,892
Portland General*	17,145	39	552,162	1.48	0	0.00	762,204	98.12	0.00	97,309
Potomac Electric Power	22,724	33	625,772	2.40	0	0.00	1,349,811	99.56	0.00	173,894
Public Service Enterprise Group*	36,483	18	1,832,681	1.28	1,432,636	1.46	4,394,692	70.33	27.38	528,586
Public Service of Colorado	19,194	37	974,043	0.72	841,436	1.14	1,685,290	66.22	32.42	112,169
Public Service of Indiana	19,972	35	577,080	1.47	0	0.00	1,043,306	98.02	0.00	99,191
Public Service of New Hampshire	7,450	69	377,461	3.27	0	0.00	603,485	100.00	0.00	52,189
Public Service of New Mexico	NA	100	NA	NA	NA	NA	NA	NA	NA	NA
Puget Sound Power & Light	16,933	41	691,511	3.46	0	0.00	791,382	100.00	0.00	115,901
Rochester Gas & Electric	7,347	73	321,643	1.45	254,143	1.61	773,978	70.23	29.77	76,114
SCANA Corporation* (SCE&G)	14,457	46	427,089	2.23	201,399	3.10	1,083,324	72.74	26.89	120,746
San Diego Gas & Electric	13,800	50	1,032,591	4.26	642,770	3.36	2,076,087	62.62	13.75	177,649
Sierra Pacific Power	4,674	85	224,396	3.76	70,707	5.19	408,423	80.10	12.39	42,007
Southern California Edison	67,886	6	3,831,656	3.08	1,193	-0.58	6,252,719	94.83	0.01	761,831
Southern Company*	130,856	1	3,187,000	1.85	0	0.00	7,235,000	98.74	0.00	846,000
Southern Indiana Gas & Electric	5,463	77	112,961	0.88	92,837	36.34	314,648	79.64	19.79	36,770
Southwestern Public Service	17,009	40	347,827	0.26	0	0.00	794,504	99.52	0.00	102,294
St. Joseph Light & Power	1,271	99	58,214	0.50	4,586	0.02	76,858	87.75	5.55	10,712
TECO Energy*	12,426	53	443,186	2.54	0	0.00	1,033,979	89.77	0.00	114,300
TNP Enterprises* (Tex-NM Power)	6,134	75	199,181	0.71	0	0.00	366,154	100.00	0.00	40,983
Texas Utilities*	80,725	3	2,110,527	0.75	0	0.00	4,153,675	100.00	0.00	642,671
Tucson Electric Power	7,860	67	260,616	2.53	0	0.00	543,064	100.00	0.00	123,445
Union Electric	30,023	25	1,067,172	1.37	109,825	1.01	2,029,107	95.52	4.30	261,333
United Illuminating	5,292	78	307,237	1.13	0	0.00	518,938	99.31	0.00	67,291
Utilicorp United	5,735	76	246,076	2.52	407,176	3.73	672,799	40.99	59.01	38,372
Washington Water Power	9,306	60	242,646	0.65	85,270	2.36	438,982	84.51	15.49	56,584
Wisconsin Energy*	24,051	31	870,780	1.32	0	0.00	1,540,712	82.78	0.00	183,186
Wisconsin Power & Light	9,223	61	332,923	1.52	117,940	2.75	600,933	75.59	19.47	57,933
Wisconsin Public Service	8,840	65	317,695	1.53	169,369	1.92	604,334	72.14	27.86	52,826

TABLE III: THE TOP 10 NET INCOME AVAILABLE FOR COMMON STOCK

Rank '88	Rank '87	Company	$ Income (millions)	'88% Change
1	5	Southern Company*	846,000	46.62
2	2	Middle South Utilities*	794,753	2.93
3	3	Southern California Edison	761,831	3.15
4	4	Texas Utilities*	642,671	-5.49
5	1	Commonwealth Edison	635,276	-35.27
6	8	American Electric Power*	626,843	24.75
7	7	Consolidated Edison	561,722	9.64
8	6	Public Service Enterprise Group*	528,586	1.56
9	11	Duke Power	497,057	11.46
10	10	Philadelphia Electric	468,765	4.58

reporting on their 1988 performances was $14.5 billion. A year ago, net income was $16.1 billion (restated).

To darken the picture, total incomes reported in 1988 included some $1.4 billion of income from non-utility activities of holding companies. In 1984, however, the Top 100 reported net income for common stock of $16.7 billion *just for utility operations*. Without the effect of diversified, non-utility profits, net income performance in 1988 was $13.1 billion—21.6 percent below the total four years earlier, hardly the picture of a robust industry.

Remember, however, that the figures are skewed because of the large writeoff taken by a few utilities. Detroit Edison posted a $428.6-million loss and Long Island Lighting, burdened with its Shoreham investment, recorded a $1.1-billion loss. These two utilities' income performances alone accounted for $1.55 billion—or more than 93.6 percent—of the Top 100 Utilities' $1.65-billion decline from 1987. In addition, Centerior Energy lost $74.0 million and New England Electric System posted a loss of $54 million.

The decline is the result of a variety of factors. Certainly writeoffs of investments in cancelled facilities and other regulatory disallowances were a major factor, as they have been in the recent past. Also, with the last major construction programs of the late 70s and early 80s now completed or nearing completion, Allowances for Funds Used During Construction were smaller in 1988. Since a number of companies with long-standing nuclear plant construction programs and other ambitious, costly construction programs have relied on AFUDC for a large part (and in some cases all) of their income, its reduction or elimination had a severe effect. AFUDC reductions among the Top 100 were about $1.5 billion.

But the end of massive AFUDC credits also represented a significant and positive change for the future. With Construction Work in Process reduced substantially as new facilities went online in 1988, and continuing projects continued to decline, the quality of utility net incomes improved. This bodes well for the quality of future earnings if construction continues to wind down.

As usual, the companies recording the largest gains tended to be companies recovering from a poor year. In 1988, only two of the 20 companies with the largest income growth were among the top 20 in 1987. Fourteen in the top 20 in 1988 were in the bottom half of the Top 100 a year ago. The biggest exception was TNP Enterprises, the parent of Texas-New Mexico Power, which ranked 3rd in 1988 on the strength of its 123.3-percent income improvement. TNP Enterprises was 11th in 1987, gaining 29.0 percent.